

CREDIT OPINION

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Washington (State of)

Update to credit analysis

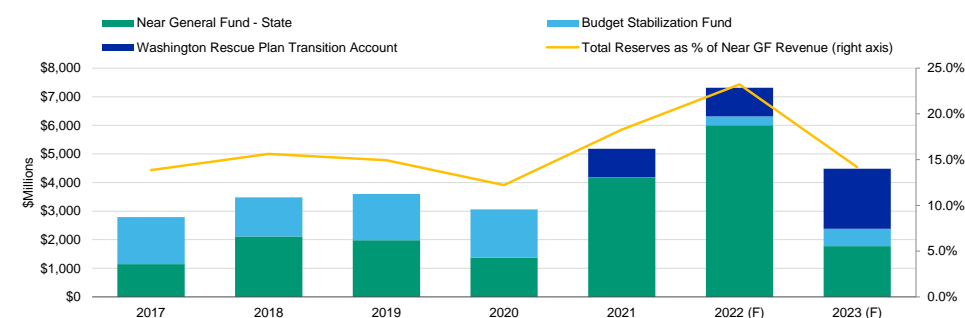
Summary

The [State of Washington's](#) (Aaa stable) credit profile is supported by its exceptionally strong economic fundamentals benefitting from the technology sector and the state's positive demographic trends. Additional credit strengths include above-average resident income levels, a sound reserve position and strong fiscal governance practices. While the state's debt levels are above average, they have been declining relative to the [50-state medians](#), the state's total leverage and fixed costs are comparable to medians. Frequent voter initiative activity adds budget challenges, but the legislature has broad authority to suspend voter-enacted statutes and a history of responding effectively to maintain budget balance.

Exhibit 1

Washington's reserves are strong, benefitting from strong revenue growth

Near General Fund – State, Budget Stabilization Account and Washington Rescue Plan Transition Account



(F) reflects forecasts as of June 2022. Near General Fund – State includes General Fund - State and certain funds that are statutorily designated as "related funds": the Opportunity Pathways Account ("OPA"), the Education Legacy Trust Account ("ELTA"), and the Workforce Education Investment Account ("WEIA")

Source: Washington State Revenue Forecasts; Moody's calculations

Credit strengths

- » Economic and demographic fundamentals are exceptionally strong, and the state should continue to outperform the nation
- » Strong financial reserves and liquidity
- » Pension funding levels are positive and retiree health insurance liability is manageable
- » Institutionalized governance practices are sound

Credit challenges

- » Exposure to cyclical commercial aerospace industry and commodity export markets, while reduced, continues
- » Debt ratios are above average, but have been declining relative to state medians

Rating outlook

Washington's outlook is stable, reflecting the positive underlying fundamentals of its economy and the state's strong governance practices which will continue to support sizable reserves. Long-term liabilities are expected to remain manageable.

Factors that could lead to an upgrade

- » Not applicable.

Factors that could lead to a downgrade

- » A sustained or structural weakening of the state's economy
- » Protracted structural budget imbalance and/or a shift to reliance on one-time budget solutions
- » A significant deterioration of the state's cash position

Key indicators

Exhibit 2

	2020	2021	State Medians (2020)
Economy			
Nominal GDP (\$billions)	604.3	667.6	243.8
Real GDP, annual growth	-0.6%	6.7%	-3.0%
RPP-adjusted per capita income as % of US	105.1%		96.7%
Nonfarm employment, annual growth	-5.4%	2.3%	-5.5%
Financial performance			
Available balance as % of own-source revenue	26.9%	22.8%	20.2%
Net unrestricted cash as % of own-source revenue	30.8%	35.4%	48.1%
Leverage			
Total long-term liabilities as % of own-source revenue	187.1%	181.6%	164.5%
Adjusted fixed costs as % of own-source revenue	7.3%	6.6%	7.3%

Available balance include unassigned, committed and assigned general fund, non-major governmental fund and internal services fund balances

Source: State of Washington ACFRs with Moody's adjustments; US Bureau of Economic Analysis; US Bureau of Labor Statistics.

Profile

Washington is the thirteenth largest state by population, at 7.8 million. Its nominal gross domestic product (GDP) is the tenth largest, at \$667.6 billion as of 2021. The population is relatively wealthy, with per capita personal income equal to 105.1% of the US after adjusting for regional cost of living.

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Detailed credit considerations

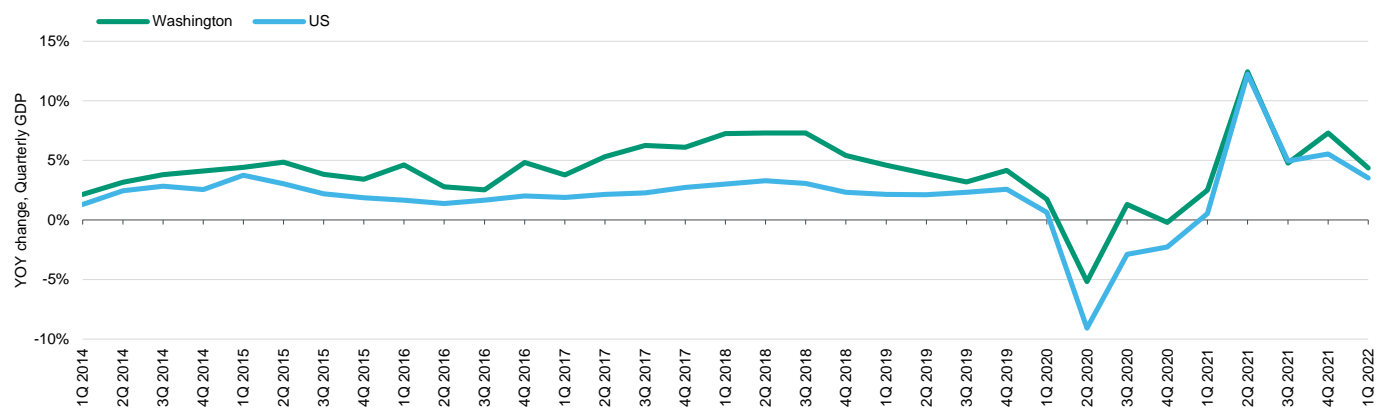
Economy

Washington's economic performance will continue to outpace the national average, supported by the technology sector centered in and around [City of Seattle](#) (Aaa stable) as well as an above average demographic profile. The Puget Sound region hosts the headquarters or major centers of operations for a dozen Fortune 500 companies, including [Amazon.com](#) (A1 stable), [Microsoft](#) (Aaa stable), [Costco Wholesale Corporation](#) (Aa3 stable), [The Boeing Company](#) (Baa2 negative) and [Starbucks](#) (Baa1 stable), among others.

As seen in Exhibit 3, The state's GDP growth has consistently outperformed that of the US heading into the coronavirus recession and during the current crisis. The five-year compound average growth rate of its real GDP was 4.4% through 2021, the strongest of all 50-states. Also positively, the growing tech sector has lessened the state's traditional dependence on aircraft manufacturing (see Exhibit 4).

Exhibit 3

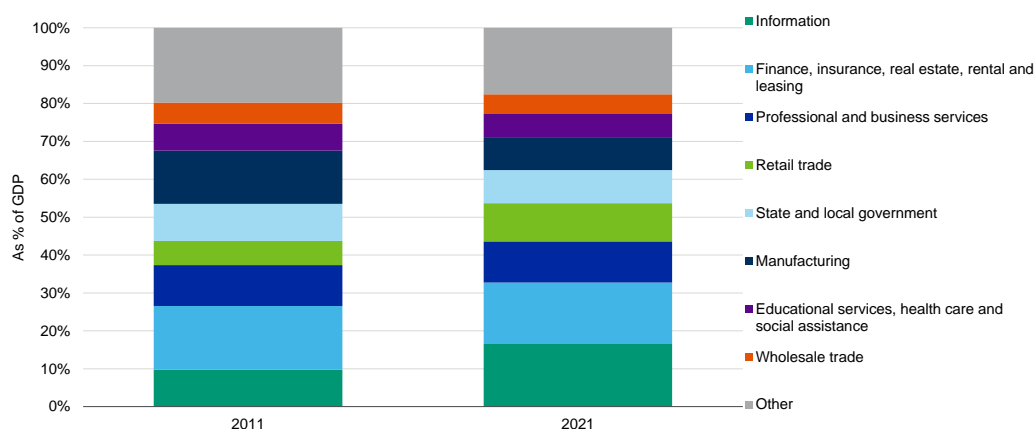
Washington's GDP growth exceeded the US rate prior to and under the recent crisis Quarterly GDP growth



Real GDP in chained 2012 US dollars
Source: US Bureau of Economic Analysis

Exhibit 4

Washington's growing information technology industry has lessened the state's traditional dependence on aircraft manufacturing Share of state GDP

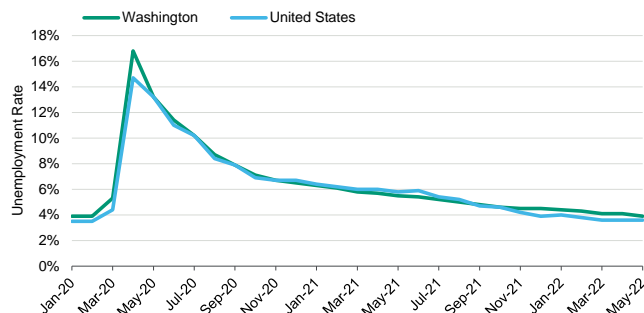


Source: US Bureau of Economic Analysis; Moody's Analytics

During the early months of the pandemic, the state experienced a more moderate loss in jobs (-11.8%) than the US (-14.7%) and its jobs recovery has been steady. Washington's employment surpassed its pre-pandemic peak for the first time in May 2022, outperforming the US, which remained 0.5% below the pre-pandemic peak. While job growth in the state's aerospace industry continues to be slow, knowledge-based industries including information technology, health, business and financial services have contributed to strong jobs

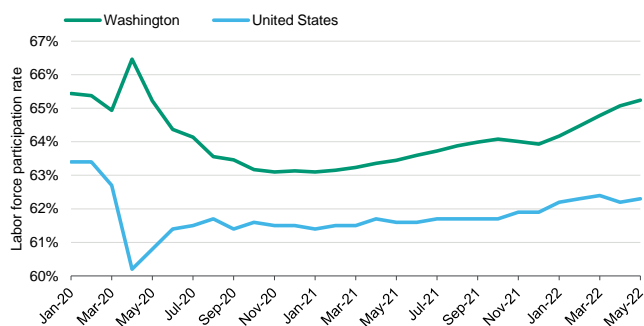
growth. The state's unemployment rate tracks closely with that of the US (Exhibit 5), although the state benefits from a higher labor force participation rate that is also recovering at a faster pace than the US (Exhibit 6).

Exhibit 5
Washington's unemployment rate tracks closely to the US rate...



Source: US Bureau of Labor Statistics; Moody's Analytics.

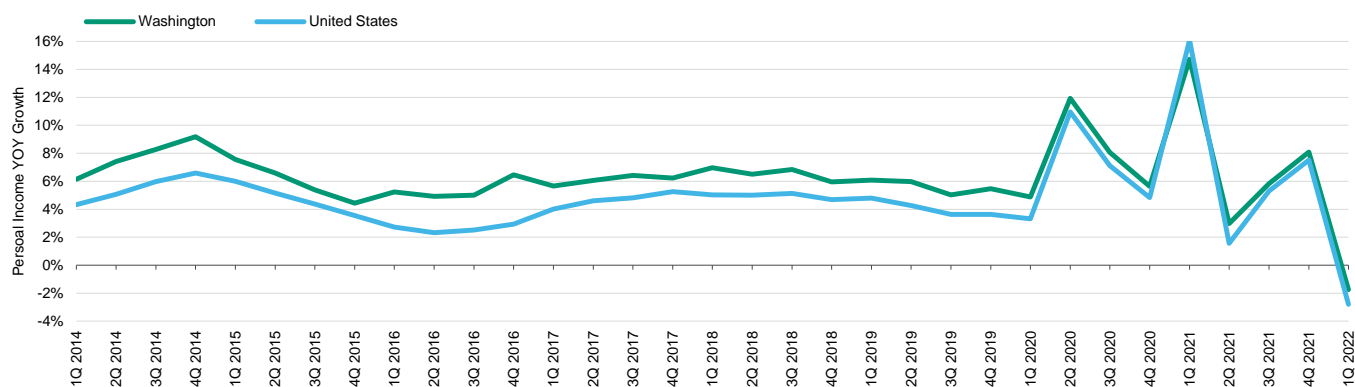
Exhibit 6
...but Washington benefits from a higher labor force participation rate



Source: US Bureau of Labor Statistics; Moody's Analytics.

Washington's per capita personal income is above average and personal income growth has generally exceeded that of the nation over the last few years. Recent volatility in income growth was related to the Federal government's efforts to provide pandemic-relief money to individuals and households.

Exhibit 7
Washington's personal income growth generally exceed the nation
Quarterly personal income growth



Source: US Bureau of Labor Statistics; Moody's Analytics.

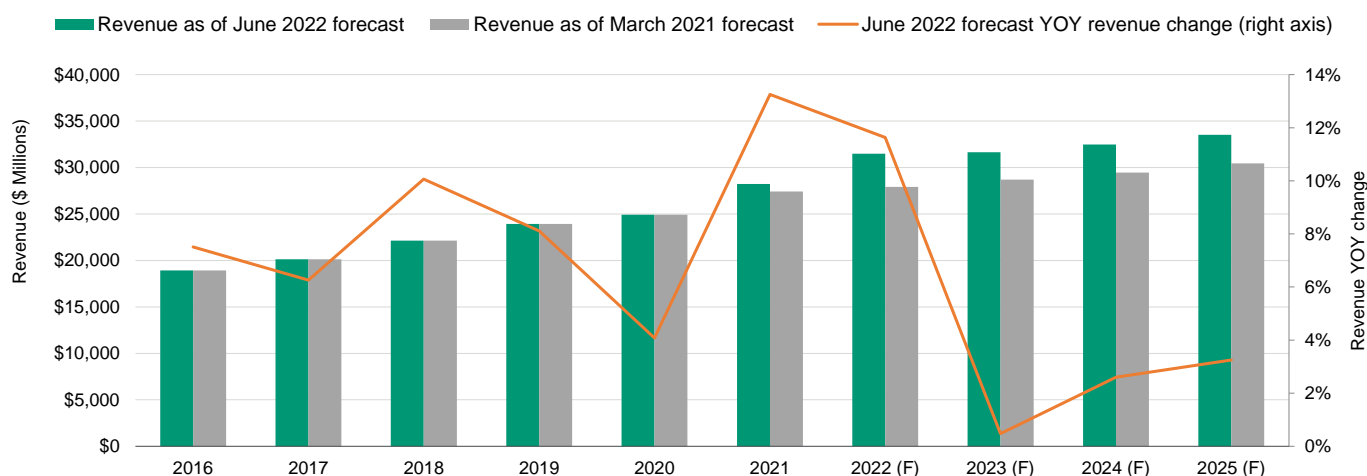
Finances and Liquidity

Washington has a sound financial position that will remain a key credit strength and provide budget flexibility through the high inflationary period. Similar to many of its peers, state revenues have increased steadily through the coronavirus pandemic, outperforming earlier projections (see Exhibit 8).

Exhibit 8

Washington's revenues have continued to improve, outperforming earlier projections

Near General Fund – State; fiscal year



(F) represents forecast; FY2021 revenue was forecasted as of the March 2021 forecast

Revenues are cash basis and include General Fund – State, ELTA, OPA and WEIA

Source: Washington State Revenue Forecasts; Moody's calculations

On a GAAP basis, the state's own source general fund revenue grew by 12.8% in fiscal 2021 over fiscal 2020, supported by strengths in all major tax revenues, namely retail sales and use tax, business and occupation tax, and property tax. The record tax revenue growth in fiscal 2021 benefitted from the income boost from federal aid, capital gains and consumer spending shifts from services to goods.

In its most recent June 2022 revenue forecast that incorporates year-to-date results for the first eleven months of fiscal 2022, the state estimated that budget-basis Near General Fund – State revenues (including General Fund - State, Education Legacy Trust Fund, Washington Opportunity Pathways Account and Workforce Education Investment Account) will increase to \$31.5 billion in fiscal 2022, up 11.6% year-over-year. The latest revenue forecast reflects upward revisions of \$3.6 billion (12.9%) from the March 2021 forecast, around when the original 2021-2023 biennial budget was adopted.

As revenue collections have greatly exceeded initial projections, and costs for continuing current programs are expected to decrease by \$1.1 billion over the current biennium, the state revised up its Near General Fund - State appropriation for fiscal 2023 by around \$5 billion under its 2022 supplemental budget. The supplemental budget includes significant one-time expenditure increases, including a \$2.0 billion one-time transfer to the state's latest transportation package and \$650 million for capital projects.

Other major policy changes that increase appropriation from the original budget include spending for housing and homelessness programs and services, long term care and developmental disabilities programs and services, natural resources program and services, and K-12. The supplemental budget also includes a \$1.1 billion transfer to the Washington Rescue Plan Transition Account (WRPTA) that remains unappropriated (see liquidity section).

Liquidity

Supported by strong revenue growth and conservative fiscal practices, the state's reserves and liquidity will remain sound. As of fiscal year end 2021, the state's budget basis available reserves (Near General Fund – State, Budget Stabilization Account and a newly established Washington Rescue Plan Transition Account) totaled \$5.2 billion on a cash basis, representing 18.3% of Near General Fund – State revenue. Based on its June 2022 revenue forecast and budgeted appropriations for fiscal 2023, the state's budget basis available reserves will remain strong at \$4.5 billion (14.2% of Near General Fund - State revenue) by the end of fiscal 2023.

The state's constitutionally restricted Budget Stabilization Account may be spent only after appropriation and under specific circumstances: by legislation approved by a simple majority if the governor declares a state of emergency, or if employment growth is forecasted to be less than 1% for that fiscal year; or by legislation approved by at least 3/5 of the members of each house.

The Washington Rescue Plan Transition Account was established under the pandemic for related expenditures and serves as a secondary rainy day fund, but with less restrictions. Monies in this account are balanced directed by the legislature from unassigned general fund balances and may only be spent after appropriation. Currently, no appropriations are made from this account in the fiscal 2021 - 2023 biennium. While balances in this account are committed to responding to pandemic impacts, allowable uses are generally broad, including those related to education, human services, health care and the economy, as well as transfers back to the unassigned general fund.

The state's available operating reserves, which for the purpose of our analysis includes unassigned, committed and assigned general fund and non-major governmental fund balances and internal services fund balance, totaled \$7.9 billion as of fiscal end 2021, representing a strong 22.8% of own-source revenue. Unrestricted operating cash totaled \$12.2 billion or 35.4% of revenue as of fiscal end 2021. The state does not issue cash flow notes.

Debt and Pensions

Washington's overall leverage (total debt, pension, OPEB and other long-term liabilities) will continue to be moderate, supported by proactive management of pension liabilities, which represents the largest share of the state's long-term liabilities (see Exhibit 9).

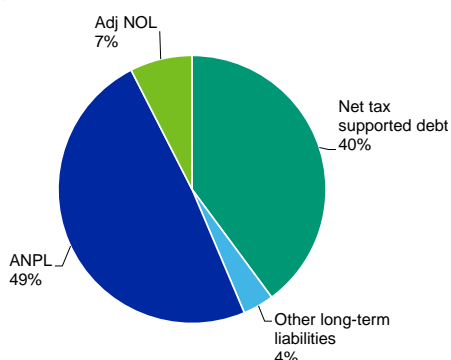
As of fiscal 2021, the state's total leverage represented 181.6% of own source revenue. The fiscal 2021 median leverage figure for all states is not yet available because select states have not finalized the audit, but based on fiscal 2020 data, Washington's fiscal 2020 leverage (187.1% of revenue) is above average but manageable compared to the 50-state median (164.5% of revenue), given its strong economic growth.

The state's fixed costs are also relatively manageable. Fiscal 2021 fixed costs (based on Moody's tread water metric) represented 6.6% of own-source revenue. The state's fixed costs burden is roughly consistent with the 50-state median based on fiscal 2020 data.

Exhibit 9

Pension represents the largest component of Washington's long-term liabilities

Fiscal 2021 long term liability breakdown

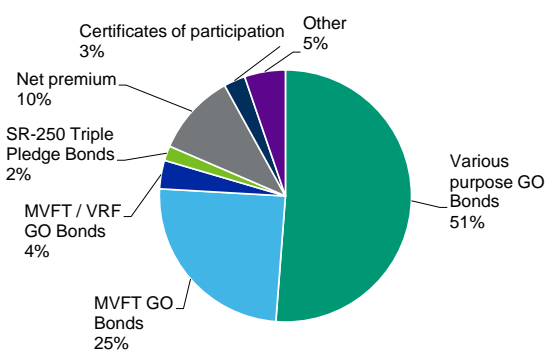


ANPL stands for adjusted net pension liability; Adj NOL stands for adjusted net OPEB liability

Source: State of Washington; Moody's Investors Service

Exhibit 10

Washington's net tax supported debt consists primarily of general obligation bonds, including those additional secured by transportation revenue



Source: State of Washington; Moody's Investors Service

Legal security

The state issues four classes of general obligation bonds: General Obligation Bonds or Various Purpose General Obligation Bonds, Motor Vehicle Fuel Tax ("MVFT") General Obligation Bonds, Motor Vehicle Fuel Tax and Vehicle Related Fees ("MVFT/VRF") General Obligation Bonds and Triple Pledge Bonds – all of which are general obligations of the state, to which the state has pledged its full faith, credit and taxing power.

The MVFT bonds are additionally secured by and expected to be paid from motor vehicle fuel taxes. The MVFT/VRF bonds are additionally secured by and expected to be paid from motor vehicle fuel taxes and other vehicle-related fees. The Triple Pledge Bonds are additionally secured by motor vehicle fuel taxes and toll revenues and expected to be paid from toll revenues.

The state also issues certificates of participation, rated Aa1, to finance capital projects and equipments on behalf of state and local agencies. The COPs are secured by and expected to be paid from payments made by participating state and local agencies including: (1) lease payments for real property projects, and (2) installment purchase payments for personal property.

Payments made by the state agencies are subject to appropriation by the legislature and executive order reduction by the governor. The state has never failed to make needed appropriations to meet the payment obligations for state agencies related to its COPs.

Payments made by the local agencies are secured by the full faith and credit of the local agencies, effectively general obligation, limited tax obligations. In the event any local agency fails to make its scheduled payment, the state treasurer is obligated to make the payment on behalf of the local agency using state funds; such state payments, if necessary, are subject to appropriation by the legislature and executive order reduction by the governor. The treasurer is further obligated to withhold an amount equal to the payment advance from the local agency's share of state aid, to the extent legally permissible. No local agency has ever failed to make a payment obligation related to state-issued COPs.

Debt structure

Washington's net tax-supported debt (NTSD) consists primarily of general obligation bonds, including those secured by and expected to be paid from transportation revenue (see Exhibit 10). The state's bonds are long-term fixed rate bonds, mainly issued with a 25-year maturity and level debt service structure; on an aggregate basis, the state's debt have declining debt service structure.

Currently, the MVFT GO bonds constitute the largest share of the state's transportation-related debt. However, pursuant to Senate Bill 5898 (effective June 9, 2022), future GO backed transportation-related bonds that remain unissued under previous authorizations are expected to be issued as MVFT/VRF GO Bonds, including any bonds issued to refund outstanding MVFT GO Bonds. As such, the MVFT/VRF GO Bonds will constitute an increasing share of the state's debt mix as the MVFT GO bonds mature and are refunded.

Debt-related derivatives

The state has no variable rate debt and no debt-related derivatives.

Pensions and OPEB

Based on the state's fiscal 2021 reporting, Moody's has calculated that the state's adjusted net pension liability (ANPL) to be \$30.7 billion or 88.8% of own-source governmental revenues. Moody's adjustments are not intended to replace the state's reported liability information, but to improve comparability with other rated entities.

Notably, the state's pension contributions have consistently exceeded Moody's calculated tread water level, or the level of contribution that would prevent reported unfunded liabilities from growing under reported assumptions. Contributing at above the treadwater level signals that the state's reported pension burden will continue to decline if investment targets are achieved.

The state's other post employment benefit (OPEB) liability is moderate. As of fiscal 2021 reporting, Moody's has calculated the state's adjusted net OPEB liability (ANOL) to be \$4.7 billion, representing 13.6% of own source revenue.

ESG considerations

Washington (State of)'s ESG Credit Impact Score is Neutral-to-Low CIS-2

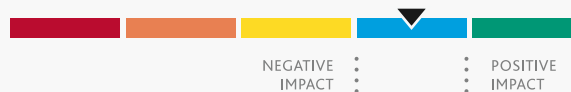
Exhibit 11

ESG Credit Impact Score

CIS-2

Neutral-to-Low

For an issuer scored CIS-2 (Neutral-to-Low), its ESG attributes are overall considered as having a neutral-to-low impact on the current rating; i.e., the overall influence of these attributes on the rating is non-material.



Source: Moody's Investors Service

Washington's ESG Credit Impact Score is neutral-to-low (**CIS-2**) reflecting its neutral-to-low exposure to environmental risks and social risks and positive governance profile.

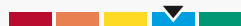
Exhibit 12

ESG Issuer Profile Scores

ENVIRONMENTAL

E-2

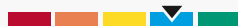
Neutral-to-Low



SOCIAL

S-2

Neutral-to-Low



GOVERNANCE

G-1

Positive



Source: Moody's Investors Service

Environmental

Washington's E issuer profile score is neutral-to-low (**E-2**). According to data from Moody's ESG Solutions, Washington counties' average projected rate of change in five climate risk factors, when weighted by county GDP, is below average in the nation. King County, which accounts for nearly 50% of the state's GDP, is not projected to have high risk in any of the five climate factors according to our assessment scale. The most significant impact of climate change for Washington may be an increase in the frequency and severity of wildfires. The state budgets a contingent amount for fires each year, but it will continue to depend upon the availability of federal aid through FEMA to mitigate the cost of the largest fires.

Social

Washington's S issuer profile is neutral-to-low (**S-2**). The state's prime working age population is growing more rapidly than the nation's, and it has a lower old-age dependency ratio than the nation. Residents have above average educational attainment and the state's labor force participation rate is above average. All of these factors contribute to the state's strong economic fundamentals and will provide resiliency under the current inflationary period. The state also benefits from positive net domestic and international migration, although this has slowed since the outbreak of the coronavirus. Offsetting the strong demographic profile is the state's housing affordability issue, which remains a significant challenge.

Governance

Washington's G issuer profile score is positive (**G-1**). Washington has strong governance practices including a quarterly consensus revenue forecasting process, multi-year revenue and expenditure projections, timely budget adoption, and a demonstrated willingness to address budget shortfalls. Since 2007, the State Constitution has required maintenance of a mandatory rainy day fund (budget

stabilization fund), which requires the transfer, by the June 30 close of each fiscal year, of at least 1% of General State Revenues for that fiscal year. In addition, by June 30 of the second year of each Biennium, three-quarters of any "extraordinary revenue growth" must be transferred to the budget stabilization fund, unless the average state employment growth for the preceding biennium averaged less than 1% per fiscal year. "Extraordinary revenue growth" is defined as the amount by which the growth in General State Revenues exceeds the average biennial percentage growth in General State Revenues over the prior five biennia by more than one third.

Although frequent voter initiative activity can create budget challenges, the state legislature has broad powers to amend or suspend voter-approved initiatives and a track record of doing so as needed to maintain budgetary balance.

Rating methodology and scorecard factors

The [US States and Territories Rating Methodology](#) includes a scorecard, which summarizes the rating factors generally most important to state and territory credit profiles. Because the scorecard is a summary, and may not include every consideration in the credit analysis for a specific issuer, a scorecard-indicated outcome may or may not map closely to the actual rating assigned.

Exhibit 13

US states and territories rating methodology scorecard Washington (State of)

	Measure	Weight	Score
Economy			
Resident Income (PCI Adjusted for RPP / US PCI)	105.1%	15%	Aaa
Economic Growth (5-year CAGR real GDP - 5-year CAGR US real GDP)	2.5%	15%	Aaa
Financial performance			
Financial performance	Aaa	20%	Aaa
Governance/Institutional Framework			
Governance/Institutional Framework	Aaa	20%	Aaa
Leverage			
Long-term liabilities ratio (adjusted long-term liabilities / own-source revenue)	181.6%	20%	Aa
Fixed-costs ratio (adjusted fixed costs / own-source revenue)	6.6%	10%	Aaa
Notching factors			
Very limited and concentrated economy			n/a
Scorecard-Indicated Outcome			Aaa
Assigned rating			Aaa

Source: US Bureau of Economic Analysis, State of Washington, Moody's Investors Service

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